

**REMARKS**

**INTRODUCTION**

In accordance with the foregoing, claims 1 and 7-27 have been amended. Claim 28 has been added. No new matter is being presented, and approval and entry are respectfully requested.

Claims 1-28 are pending and under consideration.

**REJECTIONS UNDER 35 USC § 102(b)**

In the Office Action, at pages 5-13, claims 1-27 were rejected under 35 U.S.C. §102(b), for the reasons set forth therein.

Deaton discusses using transaction history to promote products. However, Deaton discusses promoting products using coupons, not introductions, and Deaton does not find customers based on a relationship between the promoting product and products previously purchased by the customer. Furthermore, Deaton does not discuss how new products are promoted to a customer based on the customer's purchasing tendencies. These differences are discussed below with reference to the claims.

One aspect of the present invention is that: a product is selected for promotion; a similar but perhaps slower or lesser product previously offered for sale is identified by way of comparison to the promotional product; a customer that purchased the product previously offered for sale is found in the transaction history; the transaction history is used to obtain the purchasing requirement tendencies of the customer; and introduction information matching the purchasing requirement tendencies of the customer is selected from among a plurality of introductions.

Deaton does not discuss how previously purchased products are selected based on specifications of the product being promoted. The present invention selects previously purchased products by comparing the specifications of the promoting and previously purchased products, as discussed at least at page 14, lines 28-35 of the present specification. This feature has been clarified by amending the claims to recite "where the product to be replaced is found by comparing the specification information of the promotion product to specification information of previously purchased product", as shown for example in claim 1.

The rejection compares product introduction information to coupons of Deaton. Deaton does not discuss selecting introduction information (coupons) from a plurality of introductions. Deaton also does not discuss how an introduction is fit to transaction tendencies. These differences have also been clarified. For example, claim 1 now recites "by selecting from among a plurality of pre-existing product introductions the product introduction information having content that corresponds to the transaction tendencies of the target customer".

The rejection interprets "analyzing" to mean something like "scrutinize" or "inspect". However, the "analyzing" of the transaction tendency analyzer both (determines) produces and analyzes the transaction tendencies. For example, amended claim 1 recites that the analyzer "determines transaction tendencies of the target customer by analyzing the transaction histories with respect to the target customer, where the determined transaction tendencies reflect common general properties of products that the target customer has tended to purchase". In contrast, Deaton discusses specific tendencies such as the amount and frequency of purchases, rather than the general product tendencies.

The combination of features, as a whole, also distinguishes over the prior art. For example, claim 1 has been amended to clarify that the relationship between the claim features includes "searching transaction histories of a plurality of customers for customers that previously purchased the product suitable to be replaced"; and "so as to introduce to the target customer the promoting product to replace said product to be replaced that was previously purchased by the target customer" (claim 1). The prior art references do not disclose or suggest this feature.

Claim 10 recites using the rank and type of a computer; "the ranks rank a speed and a price of the computers relative to other computers", and "the types specify system types of the computers". In other words, claim 10 recites using particular features of computer sales to match customers to promoting products. Deaton does not discuss these features. Withdrawal of the rejection of claim 10 is respectfully requested.

Claims 9, 15, 16, and 21-17 recite various features similar to those discussed above, and are similarly distinguishable over the prior art. Withdrawal of the rejection of claims 1, 9, 10, 15, 16, and 21-17 is respectfully requested.

#### **NEW CLAIM 28**

Claim 28 has been added. Claim 28 recites another aspect of the present invention, and

is distinguishable over the prior art at least for reasons discussed above.

### DEPENDENT CLAIMS

The dependent claims are deemed patentable due at least to their dependence from allowable independent claims. These claims are also patentable due to their recitation of independently distinguishing features. For example, claim 2 recites determining "at least one transaction tendency of the target customer in accordance with at least one product type listed in the transaction history of the target customer". This feature is not taught or suggested by the prior art. Withdrawal of the rejection of the dependent claims is respectfully requested.

### CONCLUSION

There being no further outstanding objections or rejections, it is submitted that the application is in condition for allowance. An early action to that effect is courteously solicited.

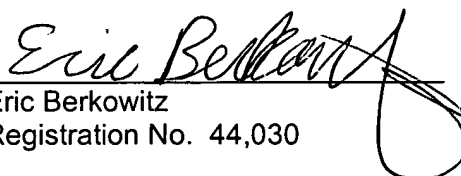
Finally, if there are any formal matters remaining after this response, the Examiner is requested to telephone the undersigned to attend to these matters.

If there are any additional fees associated with filing of this Amendment, please charge the same to our Deposit Account No. 19-3935.

Respectfully submitted,

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Date: 7/5/02

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**VERSION WITH MARKINGS TO SHOW CHANGES MADE**

**IN THE CLAIMS:**

Please AMEND and ADD to the claims as follows:

1. (TWICE AMENDED) An information decision apparatus, comprising:
  - a replacement product finder that finds a product suitable to be replaced by a promoting product based on product specification information specifying a promotion product, where the product to be replaced is found by comparing the specification information of the promoting product to specification information of previously purchased product;
  - a target customer finder that finds a target customer who purchased the product suitable to be replaced [, based on] by searching transaction histories of a plurality of customers for customers that previously purchased the product suitable to be replaced;
  - a transaction tendencies analyzer that determines [analyzes] transaction tendencies of the target customer [based on] by analyzing the transaction [history] histories with respect to [of] the target customer, where the determined transaction tendencies reflect common general properties of products that the target customer has tended to purchase; and
  - a determiner that [determines] fits product introduction information [that fits] to the transaction tendencies of the target customer [analyzed] determined by the transaction tendencies analyzer by selecting from among a plurality pre-existing of product introductions the product introduction information having content that corresponds to the transaction tendencies of the target customer, so as to introduce [a] to the target customer the promoting product to replace said product to be replaced [of] that was previously purchased by the target customer.
2. (AS ONCE AMENDED) The information decision apparatus as claimed in claim 1, wherein said transaction tendencies analyzer further comprises a transaction tendencies determiner that determines at least one transaction tendency of the target customer in accordance with at least one product type listed in the transaction history of the target customer.
3. (AS ONCE AMENDED) The information decision apparatus as claimed in claim 1, wherein said transaction tendencies analyzer further comprises:
  - a product type conversion table that converts a product type into at least one transaction tendency of the target customer, where said product type conversion table is recorded in a recording medium; and

a transaction tendencies determiner that determines at least one transaction tendency of the target customer by converting at least one product type listed in the transaction history of the target customer by using the product type conversion table.

4. (AS ONCE AMENDED) The information decision apparatus as claimed in claim 1, wherein said transaction tendencies analyzer further comprises a transaction tendencies determiner that determines at least one of the target customer transaction tendency in accordance with at least one product rank listed in the transaction history of the target customer.

5. (AS ONCE AMENDED) The information decision apparatus as claimed in claim 1, wherein said transaction tendencies analyzer further comprises;  
a product rank conversion table that converts a product rank into at least one transaction tendency of the target customer, and said product rank and conversion table are recorded in a recording medium; and  
a transaction tendencies determiner that determines at least one product rank listed in the transaction history of the target customer by using the product rank conversion table.

6. (AS ONCE AMENDED) The information decision apparatus as claimed in claim 1, wherein said determiner further comprises:  
a first transaction tendencies determiner that determines at least one transaction tendency of the target customer in accordance with at least one product type listed in a transaction history of the target customer; and  
a second transaction tendencies determiner that determines at least one transaction tendency of the target customer in accordance with at least one product rank listed in the transaction history of the target customer; and  
said determiner decides on product introduction information that fits the tendencies of the target customer based on the transaction tendencies of the target customer decided by the first transaction tendencies decision part and the second transaction tendencies decision part.

7. (TWICE AMENDED) The information decision apparatus as claimed in claim 1, wherein the product introduction information is used to promote to the target customer used products that fit the tendencies of the target customer.

8. (TWICE AMENDED) The information decision apparatus as claimed in claim 1, wherein the product introduction information is used to promote to the target customer used products that fit the tendencies of the target customer.

9. (TWICE AMENDED) An information decision apparatus, comprising:  
a target customer finder that finds target customers who purchased a product suitable to be replaced that [is] has a lower performance level than a promoting product;  
a transaction tendencies analyzer that [analyzes] determines transaction tendencies [based on] of the target customers by analyzing a transaction history for each of the target customers, where the determined transaction tendencies reflect common general properties of products that the target customers have tended to purchase;  
a tendency matrix table [that categorizes] for categorizing the transaction tendencies into at least two categories and indicates different product information by a combination of the transaction tendencies, where the two categories comprise a speed purchasing tendency and a system type purchasing tendency; and  
an information determiner that determines the product information for each of the target customers by referring to the tendency matrix table based on the determined transaction tendencies [analyzed by the transaction tendencies analyzer].

10. (TWICE AMENDED) A method of information decision, comprising:  
automatically finding a previously purchased computer [product] to be replaced by a computer being promoted, [based on] by matching a rank and type of the previously purchased computer to product specification information specifying a rank and a type of the promoting computer, where the ranks rank a speed and a price of the computers relative to other computers, and where the types specify system types of the computers;  
finding a target customer who previously purchased said computer [product] to be replaced, [based on] by searching transaction histories of a plurality of customers to find customers who previously purchased the computer designated to be replaced;  
[analyzing] deriving transaction tendencies of the target customer [based on] by analyzing a transaction history of the target customer; and  
deciding on product introduction information that fits the transaction tendencies of the target customer [analyzed in analyzing] by matching the rank and type of the promoting personal computer to the transaction tendencies of the target customer, where the product information is

capable of being used [so as] to introduce [a] to the target customer the promoting [product]  
computer to replace [said product of] the computer previously purchased by the target customer.

11. (TWICE AMENDED) The method as claimed in claim 10, wherein the [analyzing]  
deriving further comprises:

deciding on at least one transaction tendency of the target customer in accordance with  
at least one product type listed in a transaction history of the target customer; and

deciding on at least one transaction tendency of the target customer in accordance with  
at least one product rank listed in the transaction history of the target customer.

12. (TWICE AMENDED) The method as claimed in claim 10, wherein the [analyzing]  
deriving further comprises:

deciding on at least one transaction tendency of the target customer in accordance with  
at least one product type listed in a transaction history of the target customer; and

deciding on at least one more transaction tendency of the target customer in accordance  
with at least one product rank listed in the transaction history of the target customer, and wherein  
said finding said target customer further comprises

deciding product introduction information that fits the tendencies of the target customer  
based on the transaction tendencies of the target customer decided in said deciding on said  
transaction tendencies.

13. (TWICE AMENDED) The method as claimed in claim 10, wherein the product  
introduction information is used to promote to the target customer new products that fit the  
transaction tendencies of the target customer.

14. (TWICE AMENDED) The method as claimed in claim 10, wherein the product  
introduction information is used to promote to the target customer used products that fit the  
transaction tendencies of the target customer.

15. (TWICE AMENDED) A method of information decision comprising:  
finding target customers who purchased a product suitable to be replaced that has  
[being at] a lower performance level than a promoting product;  
[analyzing] determining transaction tendencies [based on] of the target customers by

analyzing a transaction history for each of the target customers, where the determined transaction tendencies reflect common general properties of products that the target customers have tended to purchase;

categorizing the transaction tendencies into at least two categories and indicating different product information by a combination of the transaction tendencies, where the two categories comprise a speed purchasing tendency and a system type purchasing tendency; and

deciding on the product information for each of the target customers by referring to a tendency matrix table based on the determined transaction tendencies [analyzed in said analyzing].

16. (TWICE AMENDED) A computer-readable recording medium recorded with a program for causing a computer to make a decision, said program comprising:

finding a product suitable to be replaced by a promoting product based on product specification information specifying a promoting product, where the product to be replaced is found by comparing the specification information of the promoting product to specification information of previously purchased product;

finding a target customer who purchased said product suitable to be replaced [, based on] by searching transaction histories of a plurality of customers for customers that previously purchased the product suitable to be replaced;

determining [analyzing] transaction tendencies of the target customer [based on a] by analyzing the transaction [history of] histories with respect to said target customer, where the determined transaction tendencies reflect common general properties of products that the target customer has tended to purchase; and

[deciding on] fitting product introduction information [that fits] to the transaction tendencies of the target customer [analyzed in the analyzing] by selecting from among a plurality pre-existing of product introductions the product introduction information having content that corresponds to the transaction tendencies of the target customer, so as to introduce [a] to the target customer the promoting product to replace the product to be replaced that was previously purchased by [of] the target customer.

17. (TWICE AMENDED) The computer-readable recording medium as claimed in claim 16, wherein the [analyzing] determining further comprises:

deciding on [a] at least one transaction tendency of the target customer in accordance



with at least one product type listed in a transaction history of the target customer; and  
deciding on at least one transaction tendency of the target customer in accordance with  
at least one product rank listed in the transaction history of the target customer.

18. (TWICE AMENDED) The computer-readable recording medium as claimed in claim 16, wherein the [analyzing] determining further comprises:

deciding on at least one transaction tendency of the target customer in accordance with  
at least one product type listed in a transaction history of the target customer; and

deciding on at least one more transaction tendency of the target customer in accordance  
with at least one product rank listed in the transaction history of the target customer, and wherein  
the finding a target customer further comprises

deciding on product introduction information that fits the tendencies based on the  
transaction tendencies of the target customer decided by the said deciding on said transaction  
tendencies.

19. (TWICE AMENDED) The computer-readable recording medium as claimed in claim 16, wherein the product introduction information is used to promote to the target customer  
new products that fit the transaction tendencies of the target customer.

20. (TWICE AMENDED) The computer-readable recording medium as claimed in claim 16, wherein said product introduction information is used to promote to the target customer  
used products that fit the transaction tendencies of the target customer.

21. (TWICE AMENDED) A computer-readable recording medium recorded with a program for causing a computer make information decision, said program comprising:

finding target customers who purchased a product suitable to be replaced that has  
[being] a lower performance level than a promoting product;

[analyzing] determining transaction tendencies [based on] by analyzing a transaction  
history for each of the target customers, where the determined transaction tendencies reflect  
common general properties that the target customers have tended to purchase;

categorizing the transaction tendencies into at least two categories and indicating  
different product information by a combination of the transaction tendencies, where the two  
categories comprise a speed purchasing tendency and a system type purchasing tendency; and

deciding on the product information for each of said target customers by referring to a tendency matrix table based on the transaction tendencies analyzed by the analyzing.

22. (ONCE AMENDED) An information decision apparatus, comprising:

a replacement commodity finder that finds a commodity suitable to be replaced by a promoting commodity based on commodity specification information that specifies a promoting commodity, where the commodity to be replaced is found by comparing the specification information of the promoting commodity to specification information of previously purchased commodity;

a target customer finder that finds a target customer who purchased the commodity suitable to be replaced [, based on] by searching transaction histories of a plurality of customers for customers that previously purchased the commodity suitable to be replaced;

a transaction tendencies analyzer that [analyzes] determines transaction tendencies of the target customer [based on] by analyzing the transaction [history] histories with respect to [of] the target customer, where the determined transaction tendencies reflect common general properties of commodities that the target customer has tended to purchase; and

a determiner that [determines a] fits commodity introduction information [that fits] to the transaction tendencies of the target customer [analyzed] determined by the transaction tendencies analyzer by selecting from among a plurality pre-existing of commodity introductions the commodity introduction information having content that corresponds to the transaction tendencies of the target customer, so as to introduce to the target customer [a] the promoting commodity to replace the commodity that was previously purchased by [of] the target customer.

23. (ONCE AMENDED) An information decision apparatus, comprising:

a target customer finder that finds target customers who purchased a commodity suitable to be replaced that has [being] a lower performance level than a promoting commodity;

a transaction tendencies analyzer that [analyzes] determines transaction tendencies of the target customers by analyzing [based on] a transaction history for each of the target customers, where the determined transaction tendencies reflect common general properties of commodities that the target customers have tended to purchase;

a tendency matrix table that categorizes the transaction tendencies into at least two categories and indicating different commodity information by a combination of the transaction tendencies, where the two categories comprise a speed purchasing tendency and a system type

purchasing tendency; and

an information decision part that decides on the commodity information for each of the target customers by referring to the tendency matrix table based on the transaction tendencies [analyzed] determined by the transaction tendencies analyzer.

24. (ONCE AMENDED) A method of information decision, comprising:

finding a commodity suitable to be replaced by a promoting commodity based on commodity specification information specifying a promoting commodity, where the commodity to be replaced is found by comparing the specification information of the promoting commodity to specification information of previously purchased commodity;

finding a target customer who purchased the commodity suitable to be replaced [, based on] by searching transaction histories of a plurality of customers for customers that previously purchased the commodity suitable to be replaced;

[analyzing] determining transaction tendencies of the target customer [based on a] by analyzing the transaction [history of] histories with respect to the target customer, where the determined transaction tendencies reflect common general properties of commodities that the target customer has tended to purchase; and

[deciding on] fitting commodity introduction [that fits] to the transaction tendencies of the target customer [analyzed in the analyzing] by selecting from among a plurality pre-existing of commodity introductions the commodity introduction information having content that corresponds to the transaction tendencies of the target customer, so as to introduce [a] to the target customer the promoting commodity to replace the commodity to be replaced that was previously purchased by [of] the target customer.

25. (ONCE AMENDED) A method of information decision, comprising:

finding target customers who purchased a commodity suitable to be replaced that has [being] a lower performance level than a promoting commodity;

determining [analyzing] transaction tendencies [based on] of the target customers by analyzing a transaction history for each of the target customers, where the determined transaction tendencies reflect common general properties of products that the target customers have tended to purchase;

categorizing the transaction tendencies into at least two categories and indicating different commodity information by a combination of the transaction tendencies, where the two

categories comprise a speed purchasing tendency and a system type purchasing tendency; and  
deciding on the commodity information for each of the target customers by referring to  
[the] a tendency matrix table based on the determined transaction tendencies [analyzed in the  
analyzing].

26. (ONCE AMENDED) A computer-readable recording medium recorded with a  
program that causes a computer to make an information decision, comprising:

automatically finding a previously purchased [commodity] computer to be replaced by a  
computer being promoted, [based on] by matching a rank and type of the previously purchased  
computer to [commodity] specification information specifying a rank and a type of the promoting  
computer, where the ranks rank a speed and a price of the computers relative to other  
computers, and where the types specify system types of the computers [commodity];

finding a target customer who previously purchased the [commodity] computer to be  
replaced, [based on] by searching transaction histories of a plurality of customers to find  
customers who previously purchased the computer designated to be replaced;

[analyzing] deriving transaction tendencies of the target customer [based on] by  
analyzing a transaction history of the target customer; and

deciding on a [commodity] computer introduction that fits the transaction tendencies of  
the target customer [analyzed in the analyzing] by matching the rank and type of the promoting  
personal computer to the transaction tendencies of the target customer, where the product  
information is capable of being used [so as] to introduce [a] to the target customer the promoting  
[commodity] computer to replace the [commodity of] computer previously purchased by the  
target customer.

27. (ONCE AMENDED) A computer-readable recording medium recorded with a  
program that causes a computer to make an information decision, comprising:

finding target customers who purchased a commodity suitable to be replaced that has  
[at] a lower performance level than a promoting commodity;

[analyzing] determining transaction tendencies [based on] of the target customers by  
analyzing a transaction history for each of the target customers, where the determined  
transaction tendencies reflect common general properties of commodities that the target  
customers have tended to purchase;

categorizing the transaction tendencies into at least two categories and indicating

different commodity information by a combination of the transaction tendencies, where the two categories comprise a speed purchasing tendency and a system type purchasing tendency; and deciding on the commodity information for each of the target customers by referring to [the] a tendency matrix table based on the determined transaction tendencies [analyzed in the analyzing].

28. (NEW) A method, comprising:

designating a computer to be promoted, where the computer to be promoted has a computing performance rating, where the computer to be promoted is one of a new computer and a used computer, and where the computer to be promoted has been determined to have sufficient value to be promoted;

identifying a particular computer model in a computer model database by comparing the computing performance rating of the computer to be promoted to computing performance ratings of computer models in the computer model database, where the particular computer model is identified because it has a computing performance rating lower than the computing performance rating of the computer designated to be promoted;

searching a customer purchase history database to find a customer that previously purchased an actual computer that corresponds to the identified particular computer model;

determining a category of pricing or speed of computers that the customer has tended to purchase by analyzing the purchase history database with respect to the customer;

determining a category of size of computers that the customer has tended to purchase by analyzing the purchase history database with respect to the customer; and

automatically selecting a pre-determined introduction from among a plurality of pre-determined introductions, where the selected introduction corresponds to both of the purchasing tendency categories, and where the pre-determined introductions each correspond to different combinations of purchasing tendency categories.